CITY OF ALAMEDA

Memorandum

To: Honorable President and

Members of the Planning Board

From: Andrew Thomas,

Planning Services Manager

Date: July 25, 2011

Re: Bay Conservation and Development Commission (BCDC) proposed Bay

Plan Amendments to address Sea Level Rise in the San Francisco Bay

<u>Area______</u>

Executive Summary

The Bay Conservation and Development Commission (BCDC) has published a series of draft amendments to the San Francisco Bay Plan to address sea level rise. Staff is requesting that the Planning Board and the Alameda community review and comment on the draft Amendments to the Bay Plan.

BCDC will be at the meeting to present their amendments, as will the Bay Rising Coalition to present some of their concerns with the amendments.

This report provides a general overview of the amendments and staff's initial reactions to the proposed amendments.

Background:

Sea level rise resulting from climate change has the potential to significantly impact the City of Alameda. The figure below shows the areas of Alameda potentially affected by a 16-inch and 55 inch increase in sea level. In 2008, the City Council adopted a Local Action Plan for addressing Climate Change. The plan acknowledges the potential impacts to the community that may result from climate change, including sea level rise. The Plan commits the City of Alameda to targeted reductions in green house gas emissions to combat climate change and reduce the potential risks of climate change effects, such as sea level rise.

In 2008, the City of Alameda Planning Department and Public Works Department issued a joint memorandum stating that the redevelopment plan for Alameda Point should include plans to mitigate at least an 18 inch rise in sea level. All subsequent planning efforts for Alameda Point have included plans to provide protection for at least an 18" rise in sea levels over 50 years and the ability to increase the height of the

protections over time, if needed, to address increases in sea level rise over 18 inches. Currently, all waterfront development projects in Alameda that are subject to environmental review and/or BCDC review are required by Alameda to address sea level rise of at least 18 inches in their plans.

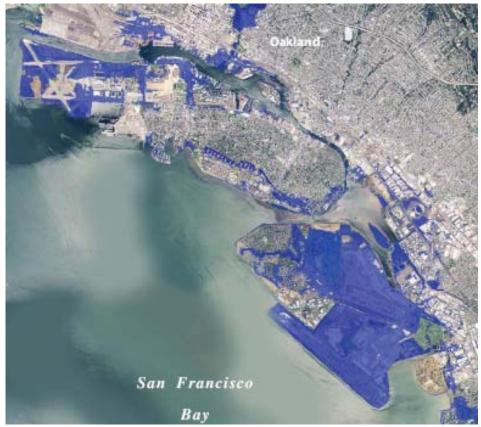
In 2009, BCDC published a series of amendments to the San Francisco Area Bay Plan to address climate change and sea level rise. The Bay Plan is BCDC's guiding document for the review of permit applications within BCDC's jurisdiction.

On November 16, 2010, the City Council adopted a resolution (included in the July 11th Planning Board packet), raising concerns about BCDC's 2010 Bay Plan proposals. The 2010 City Manager's staff report is included as Attachment 1.

In 2011, BCDC has been meeting with local jurisdictions and regional agencies and interest groups to resolve differences and address misconceptions about the BCDC proposals. On July 8, 2011, BCDC issued a staff report and a revised set of Bay Plan Amendments. That report and the most current proposed amendments are included as Attachment 2.



Potential Areas of Inundation as the Result of a 16 inch rise in sea level.



Potential Areas of Inundation as the Result of a 55 inch rise in sea level.

ANALYSIS:

Planning staff has reviewed the July 8, 2011 BCDC proposed Bay Plan Amendments. The following section provides a series of facts and observations for the Alameda community and the Planning Board's consideration:

Jurisdiction and Local Land Use Controls

The November 17, 2010 City Council resolution raised concerns that the Bay Plan amendment would "assert BCDC direction or influence over traditional City land use planning authority".

Based upon a review of the current amendments and BCDC published materials, staff is not concerned that the amendments will decrease the City of Alameda's discretion and land use planning authority.

<u>Bay Plan</u>: The San Francisco Bay Plan is BCDC's guiding policy document. The Plan is used by BCDC to determine whether a permit should be approved, approved with conditions, or denied. For several years, BCDC and City staff have been raising the issue of sea level rise and requiring that permittee's address this important issue. From

city staff's perspective, the amendments articulate and explain and provide a stronger basis for the work that BCDC and city staff have been pursuing over that last few years

<u>BCDC Jurisdiction</u>: The amendments to the Bay Plan do not change or extend BCDC's geographic regulatory jurisdiction. To change BCDC's regulatory jurisdiction would require a change to State law. By State law, any development within the San Francisco Bay, salt ponds, managed wetlands, certain waterways, and land within 100 feet of the high tide land requires a BCDC permit. In Alameda, any development within the Bay, within the Oakland/Alameda Estuary, or within 100 feet of the high tide line requires a BCDC permit. This would not change under the proposed amendments to the Bay Plan.

BCDC and City of Alameda Coordination: The proposed Bay Plan amendments do not change how the City of Alameda and BCDC work together to permit improvements on land or water within the jurisdiction of the City of Alameda and BCDC. Currently, the City departments work closely with BCDC to ensure that improvements in the water or within the shoreline band (100 feet) are consistent with the City of Alameda General Plan and Zoning Ordinance and BCDC Bay Plan. For example, on development projects, city staff always recommends that the project applicant reach out to BCDC for early consultation. In return, BCDC staff routinely checks back with City staff after the early consultation to review any potential issues. Typically, BCDC goal of ensuring safe, adequate, and attractive public waterfront open spaces has coincided well with City of Alameda objectives for safe, adequate and attractive public waterfront open spaces. The City of Alameda always takes the first action to approve or deny the project. If, and only if, the City approves the project, will BCDC take action on the BCDC permit. Staff is not aware of any project in the last 10 years that the City approved that BCDC did not also approve.

Sea Level Rise Adaptation in Alameda

As shown in the figures, sea level rise is of particular concern in a number of specific areas of Alameda. Each area has unique conditions, uses, ownership patterns, facilities and improvements. All areas are within the jurisdiction of Alameda, but only some of the shoreline areas are within BCDC's jurisdiction. Each area may require a different approach to addressing sea level rise. Given the scope, time frame, and potential costs to address the threat of sea level rise, improvements to address sea level rise will be phased in over time.

The Bay Plan amendments state that a variety of strategies and improvements might be used to address sea level rise around the Bay Area. The amendments state that circumstances and conditions that prevail on any given site will dictate the best adaptation strategy. The strategies would vary from perimeter protections (levies and dikes) to "retreating" to allow the Bay and wetlands to "reclaim" some low-lying areas.

<u>Alameda Point: A Case Study</u>. Alameda Point provides an excellent case study for the challenges that Alameda must face when confronting sea level rise. Staff and a variety

of consultants have studied extensively how best to address sea level rise and flooding at Alameda Point given the physical, social, and financial constraints of redevelopment at the former Naval base. The Alameda Point studies provide useful information for how to address sea level rise at different sites elsewhere in Alameda.

Given the large size of Alameda Point (over 1,444 acres) and its **6.42 miles** of shoreline (from the Alameda Ferry Terminal around to the Encinal Boat ramp), City staff and consultants have considered a variety of strategies to address an 18-inch sea level rise with the ability to increase the height of the protections to accommodate a larger amount of sea level rise in the future if necessary. As recommended in the Bay Plan Amendments, staff has also been studying financing tools that could be implemented to provide a source of funds in the future should the initial strategies to protect for 18 inches prove to be inadequate and the improvements need to be increased to deal with a 55 inch rise.

Ultimately, it is likely that Alameda Point will include a variety of strategies and that the improvements and protections will need to be implemented in phases over time given the huge costs of protecting 1,444 acres and 6.42 miles of shoreline. These adaptation strategies will include: 1) perimeter protections (raising the existing protective barrier and riprap or seawall), 2) imported fill to raise the level of the land in some areas (primarily in new construction areas, but not preservation areas), 3) on site storm water retention ponds or lagoons, and 4) potential use of wetlands to minimize the impacts of sea level rise. Similarly, staff anticipates that a variety of strategies will be needed elsewhere around Alameda, depending on the individual site characteristics and conditions.

Major Citywide Issues:

Local control:

Many have raised concerns about the loss of local control over land use that might be caused if the Bay Plan Amendments are adopted.

Staff does not share this concern. BCDC and the City of Alameda currently share land use control over the shoreline band (first 100 feet) and the water areas within the City limits. That sharing of control and the existing efforts to reconcile local and regional policies to provide safe, attractive, public waterfront areas will continue under the Bay Plan amendments. The fundamental relationship between BCDC and the City of Alameda does not change under the proposed amendments.

Consistency With Local General Plan and Zoning

The review of the Bay Plan amendments by City staff did not reveal any amendments that would raise concerns that the BCDC permitting process would necessarily circumvent or obstruct the City of Alameda from achieving its General Plan and

development goals within those areas of Alameda that are potentially subject to inundation from sea level rise.

Incremental Approach

Many are concerned by the incremental approach taken by BCDC. The Bay Plan amendment is an interim set of "recommendations and requirements" intended "to guide planning and permitting of development in areas vulnerable to sea level rise." (Sept. 3, 2010, BCDC staff report on Proposed Bay Plan Amendment 1-08 Concerning Climate Change). The Plan amendments focus on the permitting process for new development. It does not identify what areas specifically need to be protected, what protective measures should be taken, and how to pay for those improvements.

From staff's perspective, the issue of sea level rise is an evolving issue and the response from local jurisdictions and regional agencies will also necessarily evolve as the science, the technologies, and the funding mechanisms evolve. Staff is not concerned by BCDC's incremental approach. In fact, staff supports an incremental approach over an alternative approach that would dictate that nothing be done until every question, every issue, and every cost is resolved. Staff would be concerned that such an approach would result in a strategy of in-action.

Maps and Environmental Review

Some have raised concerns about the maps prepared by BCDC, similar to the ones in this report. These maps encompass thousands of acres around the inner bay, most of it outside of BCDC's state-mandated permit jurisdiction. It is an area that is home to hundreds of thousands of people, large employers, small businesses and family farms, vital public infrastructure, public schools, as well as under-utilized land. This land offers some of the best opportunities for infill residential growth at sufficient scale to meet state and regional objectives to bring homes closer to major jobs centers. Some have raised concerns that these maps are not accurate enough and that BCDC has failed to assess the potential environmental impacts. Others have raised concerns that the maps would affect property values.

From staff's perspective, the inundation maps prepared by BCDC are the best available *projections* of potential inundation as result of the sea level rise. They are similar to Geologic Hazard Maps that depict areas that may be subject to ground shaking or slides. From City staff's perspective, these maps provide a useful tool for policy makers, the public, and staff to understand the potential extent of the problem. Understanding the problem is an essential first step to solving the problem. Staff is not convinced that BCDC is required under the California Environmental Quality Act to conduct a complete environmental review of all of the potential implications of these maps. Such an analysis would be highly speculative, not very useful, and very expensive. Furthermore, because the Bay Plan Amendments specifically do not predetermine which adaptation strategy will be used in each instance, it would be highly speculative to try to evaluate the impacts of each strategy on each site within the Bay

Area. From staff's perspective, these alternatives and these decisions are best left to a project by project decision making process that is informed by environmental review and a detailed decision making process between BCDC staff, the property owner, and the staff from the local jurisdiction.

Recommendation:

Review and comment on the Draft Bay Plan Amendments (Attachment 2).

Respectfully submitted,

Andrew Thomas

Planning Services Manager

Attachments:

- 1. November 16, 2010 Staff Report to City Council.
- 2. BCDC's July 8, 2011 Staff Report and Proposed Amendments.